

Synthesis, Thermogravimetric, Dielectric, Electrical, and Mössbauer Studies of the CuCrO₂ Phase with the Delafossite Structure

Wednesday, 26 October 2022 16:50 (15 minutes)

Thermogravimetric, X-ray diffraction, Mössbauer, dielectric, and electrical studies were performed on ceramic samples of the CuCrO₂ phase with the delafossite structure synthesized by the method of solid-phase reactions. The effect of electric-field threshold switching of the studied samples from a high-resistance to a low-resistance state, which occurs in the temperature range of 170–200 K when a biasing electric field with a strength of >1 kV/cm is applied to the samples.

Primary authors: MATASOV, Anton (National Research University "Moscow Power Engineering Institute"); Dr BUSH, Alexander (MIREA - Russian Technological University (RTU MIREA)); KOZLOV, Vladislav (MIREA - Russian Technological University (RTU MIREA))

Presenter: MATASOV, Anton (National Research University "Moscow Power Engineering Institute")

Session Classification: Condensed Matter Physics

Track Classification: Condensed Matter Physics